

**Amendments to the Claims:**

This listing of claims will replace all prior versions, and listings, of claims in the application:

**Listing of Claims:**

1. (currently amended) An array comprising a plurality of nucleic acid probes, wherein each probe in the plurality of nucleic acid probes consists ~~essentially~~ of one of the sequences listed in SEQ ID Nos. 1-982,914 and wherein the plurality of nucleic acid probes of the array comprises each of the sequences listed in SEQ ID Nos. 1-982,914.
2. (original) The array of claim 1 further comprising at least one probe that is the perfect complement of one of the sequences listed in SEQ ID Nos. 1-982,914.
3. (original) The array of claim 1 further comprising at least one probe that is the mismatch probe corresponding to one of the sequences listed in SEQ ID Nos. 1-982,914, wherein the mismatch position is the central position.
4. (original) The array of claim 1 wherein said plurality of nucleic acid probes is attached to a solid support.
5. (currently amended) The array of claim 1 wherein the array comprises a plurality of beads wherein the probes are attached to the beads and the probes on a bead consist ~~essentially~~ of one of the sequences listed in SEQ ID Nos. 1-982,914.
6. (original) The array of claim 1 wherein the array consists of a single contiguous solid support.

Claims 7-16 (canceled)